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#### Definition

What does "Evidence-based" mean for autism treatment?

A treatment or strategy of instruction has been supported by ample research of *good quality* 

## Why the Need for Research?

- Research can isolate treatment effects
  - Through careful planning and performing of procedures
  - Tests one treatment at a time, purposely puts treatments together, or purposely takes them apart
  - To help us know for sure what caused (or didn't cause) a change
- Testimonials cannot provide *real evidence* that something works.



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- Measured 5 dimensions of each research study
- Verify accuracy of the evaluations
- Phase 1 (2009)
- Phase 2 (2015)

#### **Judging the Research**



#### **Established Interventions**

- Behavioral interventions
- Cognitive Behavioral Intervention Package
- Comprehensive Behavioral Treatment for Young Children
- Language Training Production
- Modeling
- Natural Teaching Strategies
- Parent Training
- Peer Training Package

- Pivotal Response Training
- Schedules
- Scripting
- Self-Management
- · Social Skills Package
- Story-based intervention

#### **Evidence-Based Practices**

#### **Applied Behavior Analysis**

- Antecedent-based Intervention
- Differential Reinforcement
- DTT
- Functional Behavior Assessment
- Naturalistic Intervention
- Pivotal Response Training
- Prompting
- Reinforcement
- Response Interruption/ Redirection
- Self-Monitoring
- Task Analysis
- · Time Delay

# **ABA in the Evidence Based Practices**

- Some practices are relatively benign and have not been found to be harmful, even though there is no evidence of benefit
- Other practices have documented instances of harm and present unacceptable levels of risk

### **Degrees of potential harm**

- AAC devices
- Exercise
- Exposure Package
- Imitation-based Intervention
- Language training (Production & Understanding)
- Massage therapy
- Music therapy
- PECS
- Sign Instruction
- Theory of Mind Training

### **Emerging Evidence**

- Animal-assisted therapy
- Auditory Integration Training
- Concept Mapping
- DIR/Floor time
- · Movement based intervention
- SENSE Theatre Intervention
- Sensory Integration Package
- Shock therapy
- Social Behavioral Learning Strategy
- Social Cognition Intervention
- Social Thinking Intervention

# Unestablished Level of Evidence

- Facilitated Communication
- Rapid Prompting Method
- Psychoanalytic or humanistic play therapy
- Some bonding therapies that restrain child

#### **Discredited Interventions**

#### **Evidence for Adults over 22**

- No practices with Established Level of evidence
- One practice at Emerging Level
  - · Vocational Training Package
- Unestablished Practices:
  - Cognitive Behavioral therapy
  - Modeling
  - Music Therapy
  - Sensory Integration Therapy

#### Potentially Harmful/High Risk

- Chelation therapy
- Hyperbaric oxygen therapy
- Lupron therapy

#### Potentially Benign/ Ineffective

- Anti-fungal
- Cranio-sacral therapy
- Vitamin therapy
- Diets

#### **Proven Ineffective**

- Secretin
- GFCF diets

#### **Biomedical Interventions**

## **What Exactly is ABA?**

- The practice of using the science of learning to create socially significant behavior change
  - Practical
  - Data driven
  - Adaptable
    - Group or individual
    - Home, school, community, work, anywhere!

## What ABA is NOT?

- A prescribed setting, teaching format, or type of educational material
- Only discrete trial training
- A collection of tricks
- Exclusively for individuals w/ disabilities
- Bribery
- Punitive

## Thank you

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